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Designing a model of environmental, social, and governance reporting: Evidence from Iraqi banks

Ahmed Fayez Hakim¹, DAmin Rostami^{2*}, DAmin Hajiannejad³

Corresponding author: Amin Rostami (Email: a.rostami@ase.ui.ac.ir)

Abstract

This study aims to design a conceptual model of Environmental, Social, and Governance (ESG) reporting with-in the Iraqi banking sector. It seeks to address the significant gap in understanding the drivers, strategies, and outcomes of sustainability reporting in a post-conflict economy heavily reliant on natural resources. Employing a qualitative research design based on Strauss and Corbin's grounded theory, data were collected through in-depth interviews with 28 experts, including bank executives and academic specialists in Iraqi banking and environmental affairs in 2024. A purposeful and snowball sampling technique was used until theoretical saturation was achieved. The data analysis followed a systematic three-stage coding process: open, axial, and selective coding, to develop a comprehensive model. The study resulted in a multi-faceted model for ESG reporting in Iraqi banks. The core phenomenon is the development of ESG reporting, driven by causal conditions such as environmental requirements, international pressures, and political characteristics. Contextual conditions (e.g., the country's accounting environment, financial incentives) and intervening conditions (e.g., corporate governance, bank structure, managerial behavior) influence the strategies adopted. Key strategies include identifying a responsible entity for sustainability, developing national standards, establishing internal committees, and providing targeted training. The implementation of these strategies leads to significant outcomes, including enhanced social trust, improved employee quality of life, environmental preservation, capital market growth, and improved financial reporting quality. The findings demonstrate that advancing ESG reporting in the Iraqi banking industry requires a holistic approach that considers a complex interplay of external pressures and internal organizational factors. The Central Bank of Iraq and the government are pivotal in facilitating this process through guideline formulation, oversight, and financial incentives. This research provides an actionable framework for Iraqi bank managers and policymakers to systematically enhance transparency and accountability. The identified model can guide the development of localized ESG standards, inform regulatory decisions, and help banks attract international investment by demonstrating a commitment to sustainable practices. The study's insights are also transferable to other resource-dependent economies with similar regulatory and post-conflict challenges.

Keywords: Environmental reporting, Governance reporting, Grounded theory, Iraqi banks, Social reporting, Sustainability reporting.

¹Department of Accounting, Faculty of Administrative and Economic Sciences, University of Isfahan, Isfahan, Iran.

^{2,3}Department of Accounting, Faculty of Administrative Sciences and Economics, University of Isfahan, Isfahan, Iran.

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1. Introduction

As the demand for comprehensive information regarding business operations continues to grow, traditional financial statements increasingly fall short of meeting the diverse needs of stakeholders. Conventional financial reporting is limited in scope; it often fails to present a holistic view of a company's activities and does not sufficiently capture its economic performance or overall value creation. In the context of today's globalized and interconnected business environment, exclusive reliance on traditional accounting systems hinders the ability to assess the broader external impacts of organizational operations. These systems predominantly emphasize financial metrics, while largely neglecting the environmental and social dimensions of business performance. To address these limitations, sustainability reporting has emerged as a critical tool. A sustainability report is an organizational document that provides information on a company's performance in economic, environmental, social, and corporate governance (ESG) dimensions. The disclosure of sustainability information aims to enhance transparency, strengthen brand value, build reputation and legitimacy, enable benchmarking against competitors, signal competitiveness, motivate employees, and support the company's control and information systems. In today's world, the concept of sustainability has gained such significance—across its various dimensions—that it has become a focal point for many organizations and institutions globally. For instance, the International Federation of Accountants (IFAC) has given considerable attention to this issue in its member meetings and has even developed a conceptual framework for sustainability. However, in Iraq, this topic has received relatively limited attention. Given the global expansion of business activities and the increasing importance of sustainability in organizational, academic, and professional contexts, sustainability has emerged as a strategic priority for both nations and corporations. Paying attention to sustainability reporting in Iraq's banking sector is not only an environmental and social necessity but also a critical factor for fostering sustainable and resilient economic development in the country. In Iraq's economic conditions, which are heavily affected by dependence on oil, the consequences of war, and weak regulatory structures, addressing environmental, social, and governance (ESG) reporting in the banking system is doubly necessary. Banks, as financial intermediaries, not only play a key role in the country's economic and social reconstruction, but they can also gain the trust of domestic and foreign investors by making their performance transparent through ESG reporting. On the other hand, environmental crises, high unemployment rates, and challenges related to corruption require the design of a localized framework for measuring ESG dimensions in Iraqi banks. The present study aims to provide an appropriate model of ESG reporting in Iraqi banks, covering the gap in the country's scientific literature and can provide practical guidance for policymakers and bank managers to promote transparency, accountability, and economic sustainability.

With the technological advancements that have taken place over time, we are witnessing unprecedented achievements across various fields, bringing forth new possibilities every day. However, alongside this progress, humanity is experiencing irreversible changes in both life and the environment—changes that, if not addressed in a timely manner, could prove detrimental to human existence [1]. Sustainable development represents a win-win scenario in which individuals and their surroundings grow and thrive together in harmony. Since sustainable goals are inherently long-term, their impacts are also realized over the long term. As individuals gradually adapt their lifestyles to align with sustainable objectives, their approaches to investment and income generation are also evolving [2]. In recent years, the non-financial dimensions of corporate sustainability information have drawn significant attention from both investors and policymakers. This is largely because companies that disclose non-financial information alongside financial disclosures tend to exhibit more stable and sustainable performance in the long run [3].

In a study conducted on U.S. companies, Papoutsi and Sodhi [4] found that the primary factor distinguishing leading firms from their competitors lies in the disclosure of non-financial information. Liang and Renneboog [5] argue that since the beginning of the 21st century, capital markets have placed increasing importance on environmental, social, and corporate governance (ESG) data. The study conducted by Karaman, et al. [6] highlights several benefits of sustainability practices, including increased customer and employee loyalty, waste reduction, improved productivity and risk management, enhanced investment efficiency, stronger branding, and an overall boost to corporate reputation. Therefore, it is evident that neglecting global economic trends, failing to align national economic policies with international standards, and ignoring sustainability principles can significantly weaken a country's economic position—ultimately undermining its political and security standing as well. Moreover, in today's business environment, corporate sustainability and the disclosure of related information are considered among the most critical factors in reducing the risk of bankruptcy [7].

Recent studies e.g. Misiuda and Lachmann [8] and Jonsdottir, et al. [9] have shown that corporate sustainability reporting and the disclosure of related information are increasingly important factors for investors seeking sustainable

investment opportunities. The era when investors focused solely on profit is now a thing of the past. The current landscape indicates that investors are also interested in the ethical dimensions of a company. The use of these non-financial parameters is on the rise among investors and is being incorporated into analytical processes to identify opportunities for profit and growth [10]. These non-financial indicators serve as decision-making tools for evaluating potential returns when considering investments in specific companies. In short, ESG investing represents the integrated fusion of sustainability and financial systems aimed at achieving better returns Drempetic, et al. [11].

Mathews [12] highlights the importance of non-financial disclosure by stating that, first, providing such information has a positive impact on a company's market value, and second, it strengthens the social connection between the company and the community, thereby enhancing the firm's legitimacy in the eyes of stakeholders. Furthermore, maintaining the company's market position and protecting its brand reputation can also serve as additional motivations for disclosing non-financial information [13].

Beyond the regulatory requirements for non-financial disclosure, recent research indicates that such disclosure is structured around three core dimensions [14]. The first dimension, which pertains to environmental concerns, has gained increasing attention in recent decades—driven by rapid industrial advancement on one hand, and the depletion of natural and environmental resources on the other. The second dimension, which pertains to the social aspect, has gained prominence due to the growing demands of stakeholders for companies to assume social responsibilities. This has encouraged organizations to engage in and disclose their social activities more transparently. The third dimension, related to corporate governance, has emerged as a critical focus area following the revelation of corporate scandals and the collapse of major corporations, largely due to weaknesses in governance systems. These failures have led to substantial losses for investors and stakeholders, underscoring the need to strengthen, reform, and disclose corporate governance practices to build stakeholder trust. Moreover, globalization has pushed companies in developing countries to seek entry into global markets. To gain legitimacy in these markets, it has become essential for them to demonstrate their commitment to environmental, social, and governance (ESG) responsibilities. As a result, the disclosure of environmental, social, and governance information-alongside financial reporting, commonly known as sustainability reporting-has become essential for achieving long-term, sustainable performance. Researchers have sought to identify key non-financial components and indicators by examining various frameworks, guidelines, indices, and rating systems related to corporate social, environmental, and governance responsibilities within the broader context of sustainable development. These efforts have led to the identification of the most common and frequently cited elements across the three ESG dimensions environmental, social, and corporate governance—which can serve as useful benchmarks for assessing the extent of ESG disclosure by companies.

Beyond measurement methods, understanding the extent of ESG disclosure and identifying the factors that influence such disclosures is of critical importance. Generally, these influencing factors can be categorized into two main groups: 1. Macro-level (environmental) factors, which include economic, social, cultural, technological, political, legal, and regulatory dimensions; and 2. Micro-level (organizational) factors, which are associated with a company's specific characteristics and its immediate environment.

Numerous studies have explored these factors; however, a review of the literature reveals that most prior research has only examined a limited number of these factors in isolation. To date, there has been no comprehensive investigation into the full range of determinants affecting ESG reporting. Given this gap in the literature—particularly within the Iraqi banking sector—this study aims to explore and explain the key factors influencing sustainability reporting from the three ESG dimensions. Moreover, considering the increasing importance of ESG disclosure for both companies and stakeholders, developing a model that identifies the determinants of ESG reporting for Iraqi banks is highly significant.

Accordingly, the central research question addressed in this study is: What are the core components of the ESG reporting in Iraqi banks, based on expert perspectives?

This study contributes to the literature in several dimensions. First, it explores the relatively under-researched area of ESG reporting in emerging economies, with a particular focus on Iraq, a country that has received limited scholarly attention in this field. Second, by designing a localized model of ESG disclosure, the research provides a framework tailored to the economic, social, and regulatory conditions of Iraqi banks. Third, by presenting empirical evidence from a developing country, this study can expand the global discourse on ESG practices and offer comparative insights for both regional and international scholars. Finally, the findings are expected to generate significant practical implications for policymakers, regulatory bodies, and banking institutions, thereby creating a bridge between academic research and real-world applications in transparency, accountability, and sustainable finance.

2. Literature Review

In the past, most companies assumed that their responsibilities were limited to disclosing financial performance or quantitative data, with a primary focus on maximizing profits. As a result, they paid little attention to issues related to environmental, social, and governance (ESG) disclosures, since such information was considered non-financial and thus outside the conventional scope of corporate reporting. However, this mindset has shifted significantly in recent years. Non-financial reporting is steadily increasing, and companies and shareholders alike are now recognizing that these issues have a profound impact on their long-term stability. In recent years, academic institutions have also shown increased interest in the topic of sustainability, as reflected in the growing number of published articles in this field. Moreover, there appears to be a rising awareness among organizations regarding the importance of conducting sustainable business activities. According to the findings of Rezaee [15], in 2015, 72% of the world's top 250 companies voluntarily published sustainability reports. Professional accounting bodies have likewise placed significant emphasis on sustainability-related

issues. Despite the growing global attention toward sustainability by countries and corporations, this subject has not received sufficient attention in Iraq. In a study conducted by the audit firm KPMG [16] involving 378 senior executives from major global companies, it was revealed that 62% of these companies had adopted a corporate sustainability strategy. Similarly, the International Federation of Accountants (IFAC) reported in 2015 that various dimensions of sustainability ultimately affect an organization's financial performance and its capacity to generate long-term value. Many countries such as Denmark, Brazil, Singapore, France, and South Africa—have already implemented mandatory corporate sustainability requirements. Among the notable developments is the Mexican Stock Exchange, which has recently launched its own sustainability index. This index is the third of its kind globally, following the London Sustainability Index and the Dow Jones Sustainability Index. Moreover, countries like Denmark, Norway, and Sweden require companies to report their environmental impacts [17]. In line with the importance of sustainability reporting, laws in France and the UK mandate specific companies to disclose sustainability-focused information [18]. As such, corporate sustainability has arguably become one of the most pressing concerns for governments and business organizations in recent decades. It is expected that, in the near future, sustainability reporting requirements—particularly within the Iraqi stock market and banking sector—will become more prominent. Currently, ESG reporting in Iraq, especially in the banking industry, is a relatively new concept and remains in its early stages of development. Nevertheless, some major banks and companies operating in the oil and gas sector have voluntarily begun publishing sustainability reports. These efforts reflect a growing awareness of ESG issues in Iraq. However, at present, there are no specific legal mandates for ESG disclosure in the country. Given increasing international pressure and the need to attract foreign investment, it is anticipated that ESG reporting requirements will soon be introduced in Iraq—likely beginning with publicly listed companies and major banks. Currently, there are no formal laws, directives, or guidelines in Iraq governing ESG reporting.

The Central Bank of Iraq has developed a set of guidelines regarding the implementation of ESG principles within the country's banking sector. These guidelines require banks to integrate environmental, social, and governance considerations into their operations. They encompass areas such as ESG risk management, financing of sustainable projects, corporate social responsibility, and transparency in reporting. As a result, conducting research on a coherent model for sustainability reporting—addressing causal, intervening, and contextual conditions, along with strategies and outcomes—appears essential. Such research could significantly contribute to the advancement and institutionalization of sustainability reporting practices in Iraqi banks.

Bhattacharya and Bhattacharya [19] highlighted the importance of emphasizing business models and governance structures when redesigning innovative and sustainable business frameworks. Although environmental and social factors were deemed important, they were assigned lower priority, as organizations tend to focus on these dimensions only at higher levels of maturity, after meeting more immediate operational needs. Aulia, et al. [20] argued that a major obstacle to implementing green investments is the lack of incentives from both governments and stakeholders. Sarangi [21] found that companies tend to perform better in disclosing governance-related policies and factors than environmental and social ones. A mapping of corporate environmental, social, and governance (ESG) reporting policies and regulations indicates a gradual expansion in the scope of these policies, with a noticeable shift from a voluntary to a more mandatory reporting approach. Furthermore, sustainability assessments of a selected group of corporations revealed a disproportionate emphasis on environmental aspects in both their public disclosures and practical implementation, often neglecting the social dimension. Paylopoulos, et al. [22] demonstrated a positive relationship between integrated reporting and firm performance, especially when companies aim to improve the quality of their disclosures. Troshani, et al. [23] observed that integrated reporting transforms the foundation of corporate reporting, though such a shift requires alignment with existing reporting frameworks. This approach addresses concerns related to the complexity and lack of coherence in traditional reports and provides an acceptable framework for environmental, social, and strategic disclosures. Finally, Pistoni, et al. [24] concluded that the overall quality of integrated reporting remains low. They found that information related to key aspects of integrated reporting—such as capital, business models, and value creation processes—is often inadequately disclosed. Their findings suggest that strengthening the integrated reporting framework is necessary to improve the quality and completeness of such disclosures. Qian, et al. [25] revealed that only a small number of companies utilized environmental management accounting (EMA) tools, and most of them implemented only a limited selection of these tools. Nevertheless, the application of EMA was found to have a significant impact on managing environmental issues and improving the quality of corporate disclosures. Similarly, Roxana-Ioana and Petru [26] demonstrated that integrated reporting can contribute positively to corporate governance by enhancing accountability, enabling better performance management, increasing transparency, and promoting effective leadership and risk management.

3. Materials and Methods

This study aims to develop a model for Environmental, Social, and Governance (ESG) reporting in Iraqi banks for the year 2024. Specifically, the research seeks to identify the dimensions and components of ESG reporting within the banking sector of Iraq.

3.1. Data Collection Method

In this study, several tools will be employed to collect the necessary data: Through a content analysis of prior research, the three primary domains of sustainability reporting—Environmental, Social, and Corporate Governance (ESG)—have been identified. Following a comprehensive review of the literature in the field of sustainability reporting and an in-depth examination of the dimensions and components of existing models, these three domains have been recognized as foundational for the interview questions in the present research. According to Adams and Narayanan [27] qualitative

researchers often utilize unstructured or semi-structured interviews, as structured formats tend to be overly rigid and inflexible.

Hence, unstructured interviews will be employed for data collection in this study. Strauss [28] assert that the primary aim of grounded theory—namely, theory generation—necessitates questions that permit flexibility and freedom in exploring the phenomenon under investigation.

Therefore, the questions will be designed to be open and broad, yet not so expansive as to encompass everything, nor so narrow as to impede the discovery of new insights, which is the central objective of grounded theory. To evaluate the dimensions of ESG reporting, a questionnaire will be developed based on the items derived from the interviews and subsequently utilized in the study.

3.2. Population and Sampling

The statistical population for the qualitative component of this research, which aims to identify the dimensions and components of Environmental, Social, and Corporate Governance (ESG) reporting through interviews, comprises managers of Iraqi banks and university faculty members with expertise in banking and environmental affairs.

Grounded theory, like other forms of qualitative research, does not depend on the representativeness of the sample for generalizability and validity of findings. Instead, samples are typically selected theoretically and purposefully [28].

The founders of grounded theory emphasize that data collection is a flexible and dialectical process. Theoretical sampling refers to the data collection process aimed at theory development, during which the researcher simultaneously collects, codes, and analyzes data, while also determining what additional data needs to be gathered and where to locate it to develop the emerging theory [29]. In this research, both theoretical sampling and the snowball technique have been employed. In this approach, establishing connections is crucial. Gaining the willingness and cooperation of participants is essential, and identifying the initial point of contact often represents the most significant step in entering the field. In snowball sampling, progression from one participant to the next is facilitated by the recommendations of the preceding participant, allowing each expert to introduce another knowledgeable individual in the subject area. Consequently, the number of individuals and samples cannot be predetermined in this technique. Instead, data collection continues until theoretical saturation is achieved—that is, when new data no longer yields additional insights or distinctions compared to previously collected information. At this saturation point, no new or relevant data emerges regarding a category, indicating that the category is well-developed in terms of its properties and dimensions, its variations are clear, and the relationships among categories are well established and validated.

3.3. Data Analysis Method and Tools

The present study, which aims to identify and explain the dimensions of Environmental, Social, and Corporate Governance (ESG) reporting within the Iraqi banking industry, employs a qualitative approach utilizing the Grounded Theory method developed by Strauss and Corbin. This method focuses on extracting concepts and categories from the data collected through in-depth interviews with experts and professionals in the Iraqi banking sector. By applying this approach, the study seeks to gain a deeper understanding of the phenomenon under investigation.

4. Results

As previously mentioned, this study employed Strauss and Corbin's Grounded Theory method to analyze the data obtained from the interviews. This approach emphasizes the extraction of concepts and categories from the data, enabling the development of a comprehensive and coherent conceptual model. The coding process was conducted in three stages: open coding, axial coding, and selective coding.

Open Coding: In this initial phase, primary concepts were extracted directly from the interview data.

Axial Coding: In this stage, the previously identified concepts were organized into broader categories based on their similarities and differences. For instance, concepts related to legal requirements, organizational and international mandates, management directives, and rating systems were grouped under the main category of "Environmental Requirements."

Selective Coding: In the final stage, a central category was defined, and the process of theory integration and refinement was undertaken. Here, the central category, along with causal conditions, contextual conditions, intervening conditions, strategies, and consequences, were identified and structured.

In this study, the central category is "Development of ESG Reporting in Iraq's Banking Industry."

Causal Conditions: Factors leading to the development of ESG reporting in Iraq's banking sector.

Contextual Conditions: Existing conditions and structures within Iraq's banking industry that affect ESG reporting.

Intervening Conditions: Facilitating or limiting factors in the development process.

Strategies: Measures and actions taken to enhance ESG reporting in the sector.

Consequences: Outcomes resulting from the development of ESG reporting in Iraq's banking industry.

In total, 118 initial concepts were extracted from the interviews, which were subsequently condensed into 26 main categories. The details of these categories are presented in Tables 1 to 5 which include the main categories, related concepts, and examples of interviewee statements.

Table 1.Causal Conditions of Sustainability Reporting

Category	Description
Environmental Requirements	Most experts who completed the questionnaire in the submitted file indicated that environmental requirements are the most significant factor encouraging banks to engage in sustainability reporting. Similar to other laws enacted across various sectors, legislation related to sustainability reporting should also be established and enforced. Furthermore, many Iraqi banks operating internationally are seeking to join global institutions, some of which regard the preparation and publication of sustainability reports as a prerequisite for acceptance.
Environmental Incentives	Many banks are striving to establish their legitimacy within society by emphasizing environmental issues and social responsibility. Additionally, these banks seek to address sustainability concerns to obtain reputable certifications. A significant motivating factor for banks is the reduction of political costs.
Environmental Pressures	Experts interviewed also highlighted the concept of environmental pressures. They noted that with the expansion of virtual spaces and the internet, awareness of environmental issues and the welfare of future generations has become a priority. An important aspect of this shift is the increasing accountability of various stakeholders, all of whom are employing diverse methods to prevent environmental degradation and urging banks and organizations to mitigate their harmful impacts on the environment.
Political Characteristics of the Country	The political landscape in Iraq has resulted in numerous sanctions imposed on Iraqi banks in recent years, creating major challenges that currently hinder these banks from fully focusing on sustainability issues. According to the interviewees, as the country moves beyond its historical challenges, banks are expected to increasingly prioritize sustainability, leading to growth in sustainability reporting.
International Environmental Characteristics	In recent years, online platforms and social networks have facilitated a rapid and comprehensive exchange of information regarding global issues. In this context, the global environmental and climate crises have heightened awareness among individuals, organizations, and various institutions regarding sustainability. Furthermore, stakeholders in Iraq are actively working to join relevant organizations to demonstrate their commitment to sustainability issues.

4.1. Intervening Conditions

Intervening conditions are structural factors that pertain to phenomena affecting the strategies of action and reaction. These conditions can either facilitate or restrict strategies within a specific context. Each intervening condition is associated with the concepts and categories outlined in Table 2.

Intervening Conditions of Sustainability Reporting.

Intervening Conditions of Sustainabilit	
Category	Description
Corporate Governance Characteristics	According to the interviewees in the provided file, corporate governance characteristics significantly influence banks' willingness to engage in sustainability reporting. For instance, the gender diversity of board members plays a crucial role. The theory of diversity suggests that women, due to their enhanced diversity traits, tend to have a higher propensity for corporate social responsibility. This inclination is believed to drive their participation in sustainability initiatives. Additionally, boards that include members with financial expertise are more likely to focus on sustainability issues, as these individuals possess a broader understanding of relevant topics. Ownership structure characteristics also affect sustainability reporting in banks. Institutional investors, who manage their investments with care and possess high skills in information analysis, tend to scrutinize non-disclosed information in financial reports. Consequently, banks are motivated to disclose more voluntary non-financial information to retain these important shareholders.
Structural Characteristics of Banks	Furthermore, banks engaged in international transactions are more inclined to prepare sustainability reports to facilitate these transactions, attract resources, and address the concerns of foreign parties and international stakeholders. Larger banks are generally more likely to disclose non-financial information, while older banks, benefiting from more developed reporting structures, are also more engaged in sustainability reporting. As debt and financial leverage increase, banks aim to mitigate creditor uncertainty by providing detailed disclosures, which meet informational needs and ultimately reduce agency costs.
Functional Characteristics of Banks	The agency theory predicts a positive relationship between profitability and information disclosure. Additionally, signaling theory suggests that banks with high liquidity ratios tend to disclose more information. Growth opportunities indicate the potential for accessing profitable investment projects or creating barriers to entry in specific industries.

	To facilitate easier access to resources and reduce financial costs, banks aim to publish sustainability reports.
Behavioral Characteristics of Managers	According to the interviewees in the provided file, behavioral characteristics of managers, particularly the CEO, are crucial in determining the quantity and quality of sustainability reporting. Flexible managers are more responsive to changes related to sustainability and exhibit less resistance to these changes. In contrast, overconfident and optimistic managers tend to view their decisions and actions favorably, striving to showcase their successes in sustainability reporting. Conservative managers, on the other hand, prioritize maintaining the quality of reporting and are more likely to engage in sustainability-related actions compared to their peers.
Competition in the Industry	Regarding market competition, economic theory outlines two distinct strategies for information disclosure. The first strategy, based on capabilities, drives banks to disclose more information. The second strategy, price competition, leads banks to disclose less information. When banks compete on capabilities, they are motivated to provide more information to lower capital costs. Conversely, in price competition, higher ownership costs associated with greater disclosure prompt banks to limit the information they disclose.

4.2. Contextual Conditions

Contextual conditions refer to the specific set of circumstances that converge at a particular time and place, creating situations or issues that individuals respond to with their actions. Based on the conducted interviews, sustainability reporting is influenced by the following categories, which are explained in Table 3.

Table 3.Contextual Conditions of Sustainability Reporting

Category	Description
Country's Accounting and Financial Environment	In countries with a semi-strong to strong efficiency level, banks are required to provide a high level of information. Furthermore, high-quality accounting standards are essential for the functioning of capital markets, as investment allocation decisions increasingly depend on these standards. The type of financing system—whether debt or capital market—also significantly influences the level of sustainability reporting. In systems where financing occurs through capital markets, many stakeholders focus on banks' performance, status, and liquidity, prompting banks to meet these stakeholders' information needs.
Financial Incentives	Experts believe that financial incentives play a crucial role in encouraging banks to engage in sustainability reporting. For instance, governments could implement packages where banks that publish sustainability reports benefit from lower tax rates or receive loans at reduced interest rates. Additionally, if regulatory bodies, such as the Securities and Exchange Commission, establish requirements for banks to prepare and publish sustainability reports, they could incentivize compliance with rewards. Banks that publish sustainability reports may also find it easier to issue bonds and debt instruments under more favorable conditions.
Economic Characteristics of the Country	The analysis of the research findings indicates that the economic characteristics of a country are key drivers of sustainability reporting by banks. In nations where economic indicators are favorable and basic needs are met, issues of environmental and social responsibility gain prominence, motivating companies to engage in sustainability reporting. Conversely, in unfavorable economic conditions (such as recession or inflation), banks may experience financial distress, leading them to take actions that misleadingly present their financial status and, consequently, avoid sustainability reporting.
Banking Environment Characteristics	Some interviewees noted that when a bank or organization has a clear vision statement, mission statement, and well-defined policies, they are more likely to outline their goals and follow plans to achieve these objectives. Traditional reporting of these plans often falls short, prompting these banks to utilize sustainability reporting to reflect their actions and commitments.

4.3. Strategies

Strategies are actions and reactions aimed at controlling, managing, and addressing the phenomenon in question. They are purposeful, reasoned, and goal-oriented. Experts and interviewees identified the following categories as strategies related to the cohesive sustainability reporting model. These concepts and categories are explained in Table 4.

Table 4. Strategies for Sustainability Reporting

Strategies for Sustainability Reporting. Category	Description
Identifying the Responsible Entity for Sustainability	The respondents who completed the sustainability questionnaire believed that the first strategy is to identify the entity responsible for sustainability. They suggested that a specific institution should oversee the development of sustainability standards and principles. This responsibility could either be delegated to an existing organization or a new entity could be established in collaboration with current institutions. Most interviewees preferred the latter option.
Developing Sustainability Principles and Standards	Once the responsible entity for sustainability is identified, the next step is to develop the sustainability principles and standards. Experts indicated that the initial step in this process is to obtain a conceptual sustainability framework from the designated institution. This can be achieved through an official translation or by creating a localized conceptual framework. Experts agreed that, given the current conditions, translating the existing conceptual framework and standards would be the more appropriate approach.
Establishing a Sustainability and Social Responsibility Committee in the Bank	Similar to various committees (audit, risk, etc.) established in banks to address specific issues, a Sustainability and Social Responsibility Committee should be formed to effectively manage sustainability-related tasks. This committee could operate under the management accounting department and consist of experts in various aspects of sustainability, including financial, environmental, social, and governance.
Awareness and Training on Sustainability	All bank employees—both regular operational staff and members of the Sustainability and Social Responsibility Committee—should participate in regular and periodic sustainability training programs. Banks can collaborate with institutions such as universities and professional associations to conduct these training sessions. Additionally, establishing specialized sustainability journals in the country that publish the latest developments and research in this field would be beneficial.
Implementing an Effective Internal Control and Reporting System	Implementing a proper internal cost control system, considering modern operational phenomena and the impact of current technologies, is crucial for enhancing the quality of reporting. Traditional costing systems often fail to reflect the true dynamics of processes and costs, as they typically account only for easily identifiable costs, neglecting the significant role of indirect costs in determining total costs.

4.4. Consequences

Consequences are the outcomes that arise from strategies and the formation of the core subject. They represent the results and effects of actions and reactions. According to experts, the categories in Table 5 outline the consequences associated with an integrated sustainability reporting model.

Table 5.Consequences for Sustainability Reporting.

Category	Description
Enhanced social trust	Based on expert opinions, sustainability reporting in the banking industry extends beyond merely providing financial information; it addresses the informational needs of all stakeholders, including customers, employees, shareholders, regulatory bodies, and the community. This type of reporting facilitates a more accurate assessment of banks' performance by clarifying the impacts of their activities on the environment, society, and future generations. In essence, sustainability reporting serves as a powerful tool for enhancing transparency, trust, and accountability within the banking sector. Banks that prioritize this issue can reap multiple benefits and play a significant role in sustainable development. As a crucial pillar of the economy, banks are instrumental in achieving sustainable development goals. By providing financial support for sustainable projects, aiding small and medium-sized enterprises, and adhering to ethical principles, banks can contribute to building a fairer and more sustainable society.
Improved quality of life for employees	In Iraq, sustainability reporting within the banking industry presents an opportunity to clarify and enhance the working conditions of bank employees.

	This type of reporting highlights the services and benefits provided to employees, enabling comparisons of banks' performance in this area. The Central Bank of Iraq, as the regulatory authority for the banking sector, can mandate that banks provide transparent information about employee working conditions by developing guidelines and standards for sustainability reporting. Ultimately, sustainability reporting is a vital tool for improving the work environment for employees in Iraqi banks and fostering a fair and transparent workplace.
Environmental preservation for future generations	Iraqi banks, as key pillars of the country's economy, play a vital role in preserving the environment and reducing pollution. Given the increasing importance of environmental issues, sustainability reporting enables banks to communicate their efforts in this area to stakeholders. By adhering to sustainability principles and actively reducing pollution, Iraqi banks can fulfill their responsibility to future generations. Neglecting this responsibility could jeopardize the well-being of future generations and harm the environment. The Central Bank of Iraq, as the regulatory authority for the banking industry, can mandate that banks provide transparent information about their environmental initiatives by developing guidelines and standards for sustainability reporting.
Capital market growth	In light of the growing trend of globalization, Iraqi banks are striving to attract international investors. Foreign investors are increasingly interested in banks that incorporate sustainable development principles into their operations, as such practices help reduce investment risks. Banks that produce clear and reliable sustainability reports become more appealing to foreign investors. Thus, sustainability reporting serves as a powerful tool for attracting international investment and enhancing the capital market within Iraq's banking sector. Banks that prioritize sustainability can reap multiple benefits and significantly contribute to the country's sustainable development.
Improved financial reporting quality	Experts agree that sustainability reporting greatly improves the quality of financial reporting in the banking industry. Iraqi banks, whether in response to legal requirements or voluntary initiatives, are encouraged to provide more comprehensive and transparent information regarding financial, environmental, social, and governance matters. By issuing sustainability reports, banks deliver more information to stakeholders, resulting in improved disclosure quality. Enhanced disclosure quality facilitates the auditing process, allowing auditors to examine disclosed items more accurately. The Central Bank of Iraq can further encourage banks to produce high-quality reports by developing guidelines and standards for sustainability reporting. Ultimately, sustainability reporting is a crucial tool for enhancing the quality of financial reporting and increasing stakeholder trust in Iraqi banks.

Based on the data presented in the preceding tables, the final research model is illustrated in Figure 1.

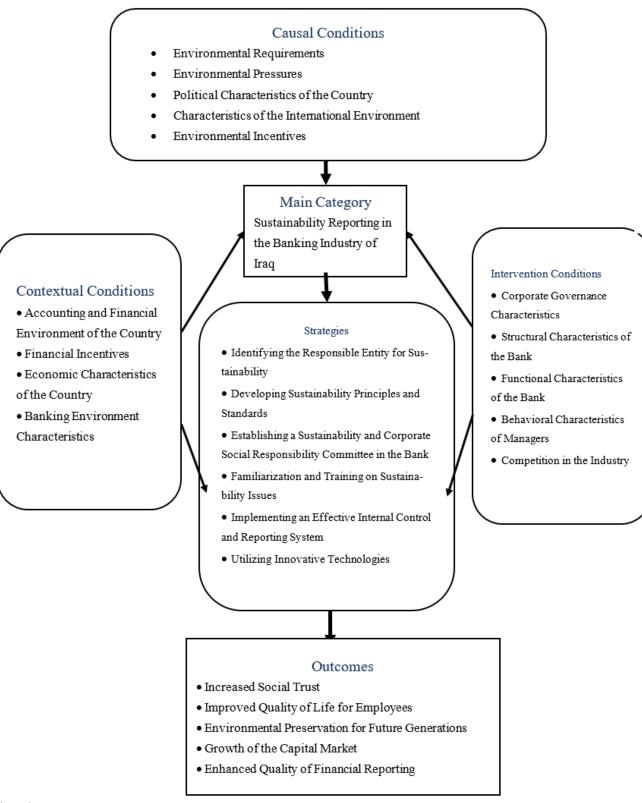


Figure 1. The Model of Environmental, Social, and Governance (ESG) Reporting in Iraqi Banks.

5. Discussion and Conclusions

The present study aimed to design a coherent conceptual model for sustainability reporting in the banking industry of Iraq. This model was developed through the analysis of data obtained from in-depth interviews with experts, employing the grounded theory methodology proposed by Strauss and Corbin. The findings of the research identified the development of sustainability reporting in the Iraqi banking sector as the central category, influenced by a complex interplay of causal, contextual, and intervening factors. Among the most significant findings are the identified causal factors, which include environmental pressures, environmental requirements (particularly rating systems and mandates from international institutions), characteristics of the international environment, political dynamics of the country, and environmental

incentives. These factors were recognized as driving forces behind the advancement of sustainability reporting in Iraqi banks. Contextual factors encompass the structure of the Iraqi banking industry, the organizational culture of banks, the level of awareness regarding sustainability, and the corporate governance system. Together, these elements form an effective contextual background conducive to the development of sustainability reporting. Furthermore, intervening factors such as the role of the Central Bank of Iraq, government support, education and capacity building, and adherence to international standards were acknowledged as facilitators or barriers in the sustainability reporting development process. Key strategies for enhancing sustainability reporting in Iraqi banks include the formulation of reporting guidelines, the establishment of sustainability management systems, the provision of specialized training, and collaboration with international organizations.

These strategies are proposed as essential for advancing sustainability reporting within the Iraqi banking sector. Finally, the consequences of implementing sustainability reporting in the banking industry of Iraq encompass increased transparency and stakeholder trust, improvements in both financial and non-financial performance, attraction of international investors, and the promotion of sustainable development within the Iraqi banking industry. These findings indicate that the development of sustainability reporting within the banking industry of Iraq necessitates a comprehensive and coordinated approach that takes into account various causal, contextual, and intervening factors.

The Central Bank of Iraq should play a pivotal role in this process by formulating sustainability reporting guidelines and standards, as well as implementing effective oversight. Additionally, Iraqi banks can improve their performance in this area by establishing sustainability management systems, providing specialized training, and ensuring transparent reporting practices. Concurrently, the Iraqi government should facilitate the advancement of sustainability reporting in the banking sector by offering financial incentives and supporting sustainable banking practices.

This research provides a comprehensive conceptual model that enhances the understanding of the dimensions of sustainability reporting in the Iraqi banking industry and can serve as a foundation for policymaking and practical initiatives in this area. The results of this study align with the findings of Al-Janadi [30], Lii, et al. [31] and Farisyi, et al. [32] which demonstrated that variables such as legal requirements, board member independence, corporate profitability, ownership concentration, growth opportunities, institutional ownership, financial leverage, industry competition, free float percentage, and the requirements of international organizations are influential in sustainability reporting.

Overall, the findings indicate that sustainability reporting in Iraqi banks is influenced by a complex array of factors, including environmental requirements, cultural and social characteristics, internal organizational dynamics, and economic and political conditions. Given the growing importance of sustainability, banks and relevant institutions must pay special attention to these factors and adopt appropriate strategies to contribute to the development and enhancement of sustainability reporting within Iraq's banking industry.

At the level of internal organizational factors, strong corporate governance, international banking activities, and intense competition in the sector are key drivers for banks to engage in sustainability reporting. In contrast, challenges such as the war and occupation by ISIS, along with financial difficulties, may hinder this process. Nevertheless, economic globalization and the presence of financial incentives can promote sustainability reporting in Iraqi banks. The research findings suggest that progressing toward sustainability reporting requires strategies such as designating a responsible sustainability authority, developing national standards, creating sustainability committees within banks, providing training, establishing an effective internal control system, and leveraging modern technologies for reporting. Ultimately, sustainability reporting leads to positive outcomes, including increased social trust, improved quality of life, environmental preservation for future generations, growth in the capital market, and enhanced reporting quality.

The findings of this study have implications beyond the Iraqi economic context. Countries with similar circumstances—such as heavy dependence on natural resources, weak regulatory frameworks, and facing serious social and environmental challenges—can also benefit from the results of this study. The indigenous model of ESG reporting can be used as a reference point for banks operating in other emerging or post-conflict economies. By applying the insights of this study, such countries will be able to improve the effectiveness of their ESG disclosure practices, strengthen investor confidence, and accelerate the process of moving towards sustainable economic and social development.

This study provides several areas for future research. First, the proposed model can be tested in other financial sectors and non-banking industries in Iraq to examine its generalizability. Second, further research could study the effects of ESG reporting on banks' financial and social performance longitudinally.

Third, a comparative study among countries with similar economic conditions to Iraq could shed light on the strengths and weaknesses of the proposed model. In addition, the use of mixed quantitative and qualitative methods and a larger sample size could increase the accuracy and validity of the findings.

References

- [1] D. Anderson and K. Anderson, "Sustainability risk management," *Risk Management and Insurance Review*, vol. 12, no. 1, pp. 25-38, 2009. https://doi.org/10.1111/j.1540-6296.2009.01152.x
- [2] R. Reed and S. Wilkinson, "The increasing importance of sustainability for building ownership," *Journal of Corporate Real Estate*, vol. 7, no. 4, pp. 339-350, 2005. https://doi.org/10.1108/14630010510700831
- [3] E. D. Baker, T. J. Boulton, and M. V. M. Braga-Alves, M. R., "ESG government risk and international IPO underpricing," *Journal of Corporate Finance*, vol. 67, no. 4, p. 101913, 2021. https://doi.org/10.1016/j.jcorpfin.2021.101913
- [4] A. Papoutsi and M. Sodhi, "Does disclosure in sustainability reports indicate actual sustainability performance?," *Journal of Cleaner Production*, vol. 260, no. 4, p. 121049, 2020. https://doi.org/10.1016/j.jclepro.2020.121049

- [5] H. Liang and L. Renneboog, "Corporate social responsibility and sustainable finance: A review of the literature," European Corporate Governance Institute Finance Working Paper No. 701/2020, 2020.
- [6] A. Karaman, M. Kilic, and A. Uyar, "Green logistics performance and sustainability reporting practices of the logistics sector: The moderating effect of corporate governance," *Journal of Cleaner Production*, vol. 258, no. 2, p. 120718, 2020. https://doi.org/10.1016/j.jclepro.2020.120718
- [7] E. U. H. Cooper, "Corporate social responsibility and bankruptcy available to purchase " *Studies in Economics and Finance*, vol. 36, no. 2, pp. 130-153, 2019. https://doi.org/10.1108/SEF-01-2018-0013
- [8] M. Misiuda and M. Lachmann, "Investors' perceptions of sustainability reporting—a review of the experimental literature," *Sustainability*, vol. 14, no. 24, p. 16746, 2022. https://doi.org/10.3390/su142416746
- [9] B. Jonsdottir, T. Sigurjonsson, L. Johannsdottir, and S. Wendt, "Barriers to using ESG data for investment decisions," *Sustainability*, vol. 14, no. 9, p. 5157, 2022. https://doi.org/10.3390/su14095157
- [10] K. Bastini, F. Getzin, and M. Lachmann, "The effects of strategic choices and sustainability control systems in the emergence of organizational capabilities for sustainability," *Accounting, Auditing & Accountability Journal*, vol. 35, no. 4, pp. 1121-1153, 2022. https://doi.org/10.1108/AAAJ-04-2020-4515
- [11] S. Drempetic, C. Klein, and B. Zwergel, "The influence of firm size on the ESG score: Corporate sustainability ratings under review," *Journal of Business Ethics*, vol. 167, no. 2, pp. 333-360, 2020. https://doi.org/10.1007/s10551-019-04164-1
- [12] m. Mathews, "Social and environmental accounting: A practical demonstration of ethical concern?," *Research on Business and Public Sector Ethics: An Austra*, vol. 14, no. 8, pp. 663-671, 1995.
- [13] A. Kolk and J. Pinkse, "The integration of corporate governance in corporate social responsibility disclosures," *Corporate Social Responsibility and Environmental Management*, vol. 17, no. 1, 2009. https://doi.org/10.1002/csr.196
- [14] K. Gödker and L. Mertins, "CSR disclosure and investor behavior: A proposed framework and research agenda," *Behavioral Research in Accounting*, vol. 30, no. 2, pp. 34-53, 2018. https://doi.org/10.2308/bria-51976
- [15] Z. Rezaee, "Corporate sustainability: Theoretical and integrated strategic imperative and pragmatic approach," *The Journal of Business Inquiry*, vol. 16, no. 1 Spec, pp. 60-87, 2017.
- [16] KPMG, "Beyond quarterly earnings: Is the company on track for long-term success?," Committee Roundtable Report, 2013.
- [17] R. Hahn and M. Kühnen, "Determinants of sustainability reporting: A review of results, trends, theory, and opportunities in an expanding field of research," *Journal of Cleaner Production*, vol. 59, pp. 5-21, 2013. https://doi.org/10.1016/j.jclepro.2013.07.005
- [18] C. Bernardi and A. W. Stark, "Environmental, social and governance disclosure, integrated reporting, and the accuracy of analyst forecasts," *The British Accounting Review*, vol. 50, no. 1, pp. 16-31, 2018. https://doi.org/10.1016/j.bar.2016.10.001
- [19] A. Bhattacharya and S. Bhattacharya, "Integrating ESG pillars for business model innovation in the biopharmaceutical industry," *Australasian Accounting, Business and Finance Journal*, vol. 17, no. 1, pp. 127-150, 2023. https://doi.org/10.14453/aabfj.v17i1.12
- [20] A. Aulia, F. Febriyanti, and L. P. Umi, "Trend analysis of ESG disclosure on green finance performance in Indonesia, Malaysia & Singapore exchanges," *Jurnal Akuntansi: Kajian Ilmiah Akuntansi*, vol. 10, no. 1, pp. 79-98, 2023. https://doi.org/10.30656/jak.v10i1.5439
- [21] G. K. Sarangi, "Resurgence of ESG investments in India: Toward a sustainable economy," ADBI Working Paper, 2021.
- [22] A. Pavlopoulos, C. Magnis, and G. Iatridis, "Integrated reporting: Anaccounting disclosure tool for substantial financial reporting and its effects on a firm's market valuation," *Research in International Business and Finance*, vol. 49, no. C, pp. 13–40, 2020. https://doi.org/10.1016/j.ribaf.2019.02.007
- [23] I. Troshani, J. Locke, and N. Rowbottom, "Transformation of accounting through digital standardisation: Tracing the construction of the IFRS taxonomy," *Accounting, Auditing & Accountability Journal*, vol. 32, no. 1, pp. 133-162, 2019.
- [24] A. Pistoni, L. Songini, and F. Bavagnoli, "Integrated reporting quality: An empirical analysis," *Corporate Social Responsibility and Environmental Management*, vol. 25, no. 4, pp. 489-507, 2018. https://doi.org/10.1002/csr.1474
- [25] W. Qian, J. Hörisch, and S. Schaltegger, "Environmental management accounting and its effects on carbon management and disclosure quality," *Journal of Cleaner Production*, vol. 174, pp. 1608-1619, 2018. https://doi.org/10.1016/j.jclepro.2017.11.092
- [26] B. Roxana-Ioana and S. Petru, "Integrated reporting for a good corporate governance," *Ovidius University Annals*, vol. 17, no. 1, pp. 424-428, 2017.
- [27] C. Adams and V. Narayanan, *The 'standardization' of sustainability reporting*. London: Routledge, 2010.
- [28] A. Strauss, & Corbin, J., Basics of qualitative research: Techniques and procedures for developing grounded theory. Thousand Oaks, CA: Sage Publications, 1998.
- [29] H. Danaee Fard and S. H. Kazemi, "Promoting interpretive research in organization: Overview of Philosophical foundations and conduction process of phenomenography," *Management Studies in Development and Evolution*, vol. 20, no. 61, pp. 121-147, 2010.
- [30] Y. Al-Janadi, Rahman, R.A. and Omar, N.H., "Corporate governance mechanisms and voluntary disclosure in Saudi Arabia," *Research Journal of Finance and Accounting*, vol. 9, no. 4, pp. 25-35, 2013.
- [31] Y. S. Lii, K. W. Wu, and M. C. Ding, "Doing good does good? Sustainable marketing of CSR and consumer evaluations," *Corporate Social Responsibility and Environmental Management*, vol. 20, no. 1, pp. 15-28, 2013. https://doi.org/10.1002/csr.294

[32] S. Farisyi, M. A. Musadieq, H. N. Utami, and C. R. Damayanti, "A systematic literature review: Determinants of sustainability reporting in developing countries," *Sustainability*, vol. 14, no. 16, p. 10222, 2022. https://doi.org/10.3390/su141610222